

Protecting You/Protecting Me Third Annual Evaluation Report September 2007

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Executive Summary

The Protecting You/Protecting Me program is being implemented on the Hopi Nation and the Navajo Nation through funding provided by the Arizona Parents Commission on Drug Education and Prevention, with oversight by the State of Arizona Governor's Office of Children, Youth and Families, Division of Substance Abuse Policy. The 2006-2007 school year was the second year of classroom implementation at Hopi schools and the first year of implementation at Navajo schools.

Protecting You/Protecting Me (PY/PM) is an alcohol-use prevention and education program that targets elementary-age students and high school Peer Helpers. PY/PM was developed by Mothers Against Drunk Driving (MADD) in efforts to reduce underage drinking and alcohol-related traffic fatalities by teaching children the effects of alcohol use and how to protect themselves in dangerous driving situations. The PY/PM program is comprised of an elementary curriculum that can be taught by classroom teachers or Peer Helpers. The Hopi and Navajo programs utilize the Peer Helper model. A semester-long training class for the high school Peer Helpers provides them the content knowledge and teaching skills to teach classes to elementary school students. The elementary curriculum is designed to be five consecutive years in length and consists of 40 lessons taught to students in grades one through five with eight lessons per grade. Elementary lessons focus on vehicle-related safety, risky behaviors, and the dangers of alcohol and its effect on brain development.

This is the third annual evaluation report of PY/PM. This report presents detailed program implementation findings for each program, participant demographics of students in the programs, and outcome findings across both programs.



Program Implementation findings

- Three hundred and eighty eight (388) elementary students and 21 Peer Helpers participated in the PY/PM program during the 2006-2007 school year.
- There is a great deal of support for the programs at both Hopi and Navajo schools, with administrators, principals and teachers dedicating class time, in-service time, transportation, and teaching staff.
- Staff and Peer Helpers in new PY/PM schools experience frustration and confusion if there is not enough orientation and training prior to program start.
- Peer Helpers received extensive and on-going training in the curriculum and classroom management skills.
- Peer Helpers with more experience felt more comfortable, interacted more with students, and exhibited greater knowledge of the material when observed in the classroom.
- Peer Helpers report challenges with classroom management, but appear to be gaining more skills in this area.
- About half (54%) of the elementary students received the full dosage of the program (all eight sessions of the PY/PM curriculum). Overall, 78% of 1st, 2nd and 3rd graders and 87% of 4th and 5th graders participated in at least 7 lessons, indicating good attendance.
- Classroom observations showed that most Peer Helpers covered most of the program material and made fewer adaptations to the lessons compared to the previous year, indicating potentially stronger fidelity.
- It was unclear if Peer Helpers fully implemented the reinforcement activities with the classes.
- Adaptations to the curriculum were made to enhance cultural appropriateness and to increase classroom interaction.
- Most elementary students who participated in PY/PM were satisfied with the program.



<u>Student Outcomes – Elementary Students</u>

- There appear to be positive trends from pre-test to post-test in knowledge gained among elementary students.
- Similar to the previous year, students in grades 1st through 3rd reported more awareness of the brain as the "boss of the body" on the post-test. For these same students, understanding of vehicle-related safety (e.g., safest place to sit in a car, not talking to the driver if the driver drank alcohol, and responding that it is not okay to drink and drive) was high before program participation and remained high at program completion.
- The number of students (1st through 3rd grades) who felt drinking was harmful to teens *decreased* from 52% at pre-test to 46% at post-test, indicating a need to provide more emphasis on this message. Similar to the previous year, there appears to be a lack of awareness of the dangers of teen drinking among younger students.
- Significance tests indicated that students in 4th and 5th grades *increased* their knowledge of media literacy (indicating more awareness of advertising tactics surrounding alcohol).
- For 4th-5th graders, data shows improvement over the previous year in the students' attitudes toward underage drinking. After going through the program, students were more likely to say that underage drinking is "not okay."
- Similar to last year, both pre-test and post-test scores for 4th and 5th graders showed students strongly intending *not* to use alcohol, quite possibly because at that age they often display socially desirable responses against alcohol use.
- A large concern is the data revealing that 22% of the students (4th-5th grade) had ridden in a car with an impaired driver, with 8% saying it occurs daily, and 6% weekly.
- Older students (4th and 5th grades) showed high awareness of appropriate vehicle safety skills (not talking to drunk driver, not sitting in the front seat) both before and after the program.
- Results indicate that some alcohol and other drug use had already occurred among 4th and 5th graders at the time they started the program, with 6% reporting they had tried alcohol or marijuana.



<u>Student Outcomes - Peer Helpers</u>

- Focus group data collected at the conclusion of the program year revealed that Peer Helpers:
 - Greatly enjoyed participating in the project
 - Felt they gained more skills and confidence in public speaking
 - o Felt they were a positive role model for the younger students
 - Learned classroom management skills and teaching skills
 - Learned a great deal about alcohol's affect on the brain.
- Many Peer Helpers felt the program helped them stay drug-free during the year; yet, one student left the program due to alcohol use.
- Due to their participation in the program, several Peer Helpers reported they intend to pursue a teaching career.
- Results regarding Peer Helpers' reports of their own alcohol and other drug use prior to the program changed from last year to this year. This year, 33% (7 students) reported prior alcohol use compared to none the previous year. Further, 29% (6 students) reported riding with an impaired driver this year (compared to none the previous year). These candid responses prior to starting the program could indicate greater trust and openness among program staff and students. No post-program data was available.
- Due to data collection difficulties, too little post-test data was available for analysis. Pre-program survey data illustrate a number of positive responses at the time the Peer Helpers entered the program, including:
 - High mean scores regarding their perceptions of the risks of binge drinking and driving while impaired.
 - o A moderate understanding of how alcohol affects the brain.
 - High mean scores regarding their perceived abilities to resist pressure to use alcohol.
- Peer Helpers at pre-test showed less knowledge about the risks of low levels of alcohol use, and a moderate level of confidence in their speaking skills.



The evaluation findings indicate that students, Peer Helpers, teachers, and project and school administrators are committed, receptive and positive about the program. Because implementation of the PY/PM program has been ongoing for only two years at Hopi, and only one semester at Navajo, interpretation of outcome results should be undertaken with caution. While there appear to be positive baseline trends from pre-test to post-test among the elementary participants' responses, a number of factors affect the quality of findings, including difficulties in testing young children, and exposure to messages from other sources (e.g., parents, siblings, peers, media), and lack of a comparison group. In addition, given the program model is based on building a cumulative set of knowledge and skills over five years of program exposure, it will take several years to clearly identify the impacts of the program on student and teen attitudes, intentions, and behaviors regarding underage alcohol use.

Based on this year's evaluation findings, the evaluation team recommends the following:

- Increase emphasis and training in completing the reinforcement and ownership activities in the elementary classrooms
- Provide increased time for the Peer Helpers to observe elementary classrooms prior to starting their teaching.
- Encourage the elementary classroom teachers to share their classroom management methods with the Peer Helpers to gain concrete suggestions and feedback at each grade level.
- Observe and assess Peer Helpers' teaching skills and efficacy throughout the year, and target specific "refresher" and supplemental trainings to increase teaching skills
- Ensure that all the materials from each lesson are completed and the full 8 lessons are provided to all students.
- Continue to retain some second year Peer Helpers as well as recruit new Peer Helpers early in the spring.
- Continue to develop, expand and document community and school service projects for second semester
- Provide support, training, and ongoing resources to strengthen Peer Helpers' personal resistance skills and get help if they do use alcohol or other drugs.



- Build and maintain connections with elementary school and high school teachers, the school administrators, the program coordinators, and evaluators to ensure accurate and timely data collection.
- Continue to collect evaluation data for the full duration of the curricula sequence.
- Outline a plan for sustaining the program, including incorporating it into a framework of a comprehensive school-wide approach to alcohol and other drug abuse prevention and early intervention.

Introduction and Background

In 2004, the Arizona Governor's Office of Substance Abuse Policy, with funds from the Arizona Parents Commission, sought proposals from Native American tribal communities to implement the Protecting You/Protecting Me (PY/PM) underage alcohol use prevention program in their schools. As of fall 2007, two Arizona tribal communities, the Hopi and Navajo Nations, have received grants and implemented the program. LeCroy & Milligan Associates, Inc. has conducted an evaluation of Protecting You/Protecting Me since the inception of the program in 2004.

The 2006 Arizona Youth Survey conducted by the Arizona Criminal Justice Commission (ACJC) reveals that lifetime alcohol and other drug use among Arizona students has decreased since 2002, but underage drinking remains a significant concern throughout Arizona, with 50% of 8th graders, 68% of 10th graders, and 75% of 12th graders reporting alcohol use at some time. (ACJC, 2006). In comparison to national rates of substance abuse noted in the National Institute of Drug Abuse (NIDA) *Monitoring the Future* survey, Arizona youth in 8th, 10th, and 12th grades report higher lifetime rates of alcohol use than national rates (ADJC, 2006). Heavy alcohol use continues to be a significant issue among Arizona youth with nearly 20% of Arizona students reporting binge drinking (5 or more alcoholic beverages on one occasion) in the past two weeks. Other studies revealed that 27% of surveyed Arizona youth had their first drink of alcohol before age 13, a particular concern because these youth are more likely to become alcohol dependent (ADJC, 2006; Grant & Dawson, 1997).

Underage drinking is linked to numerous risky behaviors and problems, including violence, alcohol-related traffic crashes, injury, high-risk sex, property crime, academic problems, fetal alcohol syndrome, and alcohol poisoning. The consequences of youth drinking cost Arizona citizens nearly \$1.3 billion in 2005, with the largest costs due to youth violence and traffic crashes (ADJC, 2006). In the 2006 Arizona Youth Survey, 32% of surveyed youth reported riding in a car driven by an alcohol-impaired driver within the past month, and 69% of respondents 16 years or older reported driving after drinking within the past month.



The demand for effective and empirically supported prevention programs has lead to research and meta-analysis of numerous interventions to identify critical elements and principles of effective prevention programming (see for example, Foxcroft, et. al., 2002; Tobler, 1997; Tobler et. al., 2000). School-based programs have been the most commonly developed prevention programs, often using knowledge-based approaches, social skills training, mentoring or school climate change approaches. (LeCroy & Mann, 2004). Tobler (1997), in a meta-analysis of school-based programs, found that successful programs exhibit:

- developmentally-appropriate content without scare tactics or exaggerated information
- interactive, skill-building processes
- shared interactive teaching by peers and teachers
- small group size.

Other research suggests that effective school-based programs include:

- comprehensive implementation from elementary through high school
- targeted interventions that consider language, age, and culture.

General principles of effective prevention interventions have been culled and identified by the Center for Substance Abuse Prevention (Gardner & Brounstein, 2001) and by Health Canada (2001). The more fully these principles are reflected in a program, the greater the likelihood for effectiveness. These principles, identified in the table below, may be used as a framework in assessing a program's potential effectiveness.



Table 1. Principles of Effective Prevention Programs

Build a strong framework	address protective factors, risk factors, and resiliency					
	seek comprehensiveness					
	ensure sufficient program duration and intensity					
Strive for accountability	base program on accurate information					
	set clear and realistic goals					
	monitor and evaluate the program					
	address program sustainability from the beginning					
Understand and involve	account for the implications of adolescent psychosocial					
young people	development					
	recognize youth perceptions of substance use					
	involve youth in program design and implementation					
Create an effective	develop credible messages					
process	combine knowledge and skill development					
	use an interactive group process					
	give attention to teacher and leader qualities and					
	training					

Source: From *Preventing Substance Abuse Problems among Young People: A compendium of Best Practices*, by Health Canada, 2001, Ottawa, Ontario: Minister of Public Works and Governmental Services.

Protecting You/Protecting Me Alcohol Use Prevention Program

Protecting You/Protecting Me is an alcohol-use prevention and education program that targets elementary-age students and high school Peer Helpers. PY/PM was developed by Mothers Against Drunk Driving (MADD) in efforts to reduce alcohol-related traffic fatalities by teaching children the effects of alcohol use and how to protect themselves in dangerous driving situations. PY/PM has been identified by SAMHSA (the Substance Abuse and Mental Health Services Administration) as a model program and was developed to incorporate the "Principles of Effectiveness" identified by the U.S. Department of Education in 1998.



Studies indicate that children begin to acquire an understanding about alcohol at a very early age, often before they have any direct involvement with it (Fossey, 1993; Lloyd, 1996). Accordingly, PY/PM is based on the assumption that children who learn about the effects of alcohol will develop negative attitudes toward alcohol use and will thereby be less likely to use alcohol in the future. PY/PM is also intended to increase social skills, self-protection skills for vehicle safety, assertiveness skills, knowledge of how the human brain develops, and awareness of media advertisements of alcoholic beverages.

Lessons and activities teach children in 1st through 5th grades about their brains, the effect of alcohol on the brain, and vehicle safety. PY/PM consists of a 40-lesson curriculum with eight lessons per grade. Lesson topics include:

- The brain
- Growth and development
- Health and safety
- Rules and laws

- Friends
- Choices and decisions
- Media awareness
- Communication

The curriculum is tailored to the age-appropriate level of each grade, with lessons for subsequent grades built upon information provided in the previous grade. Each lesson is designed to incorporate "reinforcement" activities at the end of the lesson. For 1st through 3rd grades, those activities include: drawing or writing about something that protects their brains; creating models of neurons and communication within the brain; "rhyme/rap/cheer" exercises, which combines lesson information with music created by the students; and discussion of warning labels. For 4th and 5th grades, activities include: writing letters and stories that illustrate the harm caused by alcohol; conducting role plays about being safe around people that have been drinking; and developing slogans and posters to illustrate the PY/PM message.



The PY/PM elementary curriculum can be taught by classroom teachers or Peer Helpers. The Hopi and Navajo programs utilize the Peer Helper model. The program includes a training curriculum for the high school Peer Helpers that prepares them to teach the elementary curriculum. The Peer Helpers participate in a semester-long class that teaches them the content topics as well as personal values exploration, and teaching and presentation skills.

Several studies of PY/PM have been conducted to examine the effects of the program on elementary students and teen Peer Helpers. Evaluations of PY/PM have mixed results. Bell and colleagues (2005) found that students who participated in PY/PM made significant gains only with vehicle safety skills and media literacy. Other studies (e.g., Bell, Kelley-Baker, Rider, & Ringwalt, 2005) have found gains in vehicle safety skills, stress management, and decision-making; improved knowledge of the brain and alcohol's effect on development; and changes in attitudes toward underage alcohol use and its harm. Overall, results have shown that students receiving the program have increased knowledge of the brain, increased perceptions of the harmfulness of underage alcohol use, improved vehicle safety skills, and have become more aware of media messages surrounding alcohol (Bell. Kelley-Baker, Bliss, Jones, & Faith, 2004; Bell, Kelly-Baker, Falb, & Roberts-Gray, 2005; Bohman et al., 2004). Studies have also demonstrated that Peer Helpers who taught PY/PM gained knowledge of alcohol's effects and increased their perceptions of the risks of high levels of alcohol use than similarly situated peers who did not teach PY/PM (Padget, Bell, Shamblen, & Ringwalt, 2005). To demonstrate the impact of PY/PM on high school Peer Helpers' and elementary students' attitudes towards alcohol, many studies look at the impact of the program over time (e.g., exposure to the program over several years) and/or utilize a comparison or control group. Studies examining the cumulative effects of the program revealed that students retained lessons learned in previous years and scores improved with increased exposure to PY/PM. Furthermore, studies employing a comparison group have suggested that participants of PY/PM, relative to comparison students who did not have PY/PM exposure from matched schools, demonstrated increased knowledge of the effects of alcohol, their perception of potential harm of alcohol use, and their vehicle safety skills (e.g., Padget, Bell, Shamblen, & Ringwalt, in press).



Evaluation of the Protecting You/Protecting Me programs

LeCroy & Milligan Associates, Inc. has conducted the program evaluation of the Protecting You/Protecting Me program since 2004. The evaluation of PY/PM is designed to inform funders, administrators, and program staff about the implementation (process) and impacts (outcomes) of the teen-led program being implemented on the Hopi Nation since fall 2005, and the Navajo Nation since spring 2007. The first annual evaluation report (LeCroy & Milligan Associates, Inc., 2005) provided a summary of the evaluation design and methods and early project start-up processes at the Hopi Nation, as the program was not implemented in classrooms until fall of 2005. The second annual report (LeCroy & Milligan Associates, Inc., 2006) provided information about the first full year of implementation at Hopi Nation and initial data regarding student outcomes. Mid-year progress reports each year have focused on program implementation characteristics and challenges, and some of that information is included in this annual report as well. This report is the third annual evaluation report for the initiative and reflects data from the 2006-2007 school year.

The development of the PY/PM program with the Hopi and Navajo Nations has been an evolving process requiring a long-term evaluation perspective to provide information for program improvement and determine program impacts. Throughout the three-year evaluation period, several qualitative and quantitative evaluation methods have been used to develop a multifaceted description of the program and program impacts and to make recommendations for program improvements. These methods include:

- Review of program materials
- Interviews and focus groups with program participants and staff, including Peer Helpers, program coordinators, teachers, and school principals
- Pre-program and post-program surveys
- Program attendance and tracking forms
- Fidelity instruments
- Classroom observation forms.

The research questions addressed by the three-year evaluation are provided in Appendix A.



Findings presented in this report focus on implementation results (i.e., delivery, participant satisfaction, program attendance and fidelity), descriptions of elementary school participants and Peer Helpers, and short term changes for students as measured through participant pre- and post-surveys completed during the 2006-2007 school year. Specifically, this includes:

- 313 matched pre-post program surveys from elementary school participants (1st 3rd graders & 4th 5th graders)
- 21 pre-program surveys from Peer Helpers and 6 post-program surveys from Peer Helpers
- 131 classroom observation forms from teachers and project administrators
- 203 class response forms from Peer Helpers covering PY/PM sessions
- Attendance data on 388 project participants
- Focus group and interview data from students, staff and program administrators

Because implementation of the PY/PM program has been ongoing for only two years at Hopi schools and one year for Navajo schools, interpretation of outcome results should be undertaken with caution. Furthermore, the PY/PM program is intended to be a five-year intervention, with each year's information building upon the previous year. Therefore, it will take several years to clearly identify the impacts of the program.



Overview of Program Implementation

The Protecting You/Protecting Me (PY/PM) program is a teen-led alcohol use prevention and education program in which high school students—called Peer Helpers—teach classes of elementary school students about vehicle-related safety and the dangers of alcohol and its effect on brain development. The program's primary strategy consists of two curricula; one curriculum is used to train the Peer Helpers to administer the second curriculum to elementary school participants. The program is designed to provide five years of progressive curriculum for grades 1st through 5th. The lessons for each subsequent grade are built upon information provided in the previous grade.

As of May 2007, the Hopi Nation program completed its second year of implementation and the Navajo Nation program completed its first year of programming. Since the programs are at different stages in their development, information about each program's implementation is reported separately below.

Program Implementation – Hopi Nation

During the 2006-2007 school year the Hopi Nation PY/PM program was taught in two elementary schools. During fall semester 2006, the Peer Helpers taught at Second Mesa Day School (October-December) and in the spring semester they taught at First Mesa Elementary School (February-April). This year (2006-07) was the second year of implementation at Second Mesa Day School and the first year of implementation at First Mesa Elementary. The Peer Helpers were organized into teams of two and were assigned to teach one grade level class each. At each school, there were ten classes, two classes in each of the 1st through 5th grades.

For the 2006-2007 school year, sixteen high school students at the Hopi Junior/Senior High School were recruited to be Peer Helpers in the spring prior to the start of the school year. Two students were returning Peer Helpers from the previous year. The recruitment process followed the recommended methods outlined in the PY/PM curriculum, including making a school-wide presentation, soliciting teacher and student recommendations for appropriate students, applications, and final selection by the project teacher.



A new Peer Helper teacher was identified for the 2006-2007 school year because the teacher from the previous school year resigned her position. The new teacher attended the PY/PM teacher training during the summer of 2006 and was prepared to start the class in the Fall 2006-07 school year. She brought a background in science education and leadership development with teens, as well as a keen interest in the program.

The high school Peer Helpers received school credit for participating in the PY/PM project and the class met daily as an elective. The first four weeks of class were devoted to training the Peer Helpers to teach the PY/PM curriculum. The training included sessions on content knowledge, teaching skills, classroom management, presentation skills, and personal values and behavior. In addition to the curriculum-based activities for the Peer Helper training, the Peer Helper teacher and the Project Coordinators provided additional team-building activities with the students to build relationships among students who previously didn't know each other and to increase their skills in working in small groups. The training helped the Peer Helpers feel more comfortable, so that they could substitute for one other if one member of the teaching team was absent. The students were also required to commit to abstain from alcohol or other drug use during their participation as Peer Helpers.

After the initial period of training, the Peer Helpers followed a consistent weekly format. Four days a week they prepared, rehearsed and reviewed lesson plans and on the fifth day the Peer Helpers traveled to the elementary school to teach the 8-week PY/PM curriculum.

Recruitment for the next class of Hopi Peer Helpers for the 2007-08 school year began in March 2007. Twenty-two Peer Helpers were identified by May, with several returning students signing up to teach a second year. Peer Helpers made presentations about PY/PM to the sophomore and junior classes, and distributed application forms. Recommendation forms were sent out to teachers and administrators and the final selection was made by the Peer Helper teacher.



In August 2007, the Peer Helpers from Hopi joined the new Peer Helpers from Navajo in a 2-day training retreat to begin to build their teams and learn curricula content for the new year.

Community Service and Supplementary Activities--Hopi

In addition to teaching the eight-session PY/PM curriculum, the Peer Helpers planned and carried out several community presentations and projects during the school year, as described below:

- In the fall semester, the students made a presentation to the Parents Association at Second Mesa Day School about the PY/PM program and the concepts included in the curriculum, such as brain development, vehicle safety and substance abuse.
- In May 2007, several students and a parent joined Kappie Bliss, the developer of the PY/PM program, to present a workshop at the *Partnerships to Prevent Underage Drinking through Policy, Education and Enforcement* conference sponsored by the Arizona Governor's Office.
- In May 2007, the PY/PM program participants (Peer Helpers, elementary students, school staff, and parents) came together for an end of the year celebration to recognize their accomplishments with the program.

Program Implementation - Navajo Nation

The Navajo Nation PY/PM program began with project design, recruitment, and teacher training in the fall of 2006. The Spring 2007 semester marked the first semester of program implementation at Red Mesa Schools on the Navajo Nation. Spring 2007 accomplishments included completing classes for the first PY/PM cohort at Red Mesa Elementary School and broadening recruitment of Peer Helpers at Red Mesa High School in preparation for the Fall 2007 implementation.

In December 2006, the Red Mesa High School counselor contacted select high school students to solicit their participation in the program and recruited the first group of five Peer Helpers to launch the program at Red Mesa Elementary School. The students received school credit for participating in



the PY/PM project. After an initial period of training (approximately one month), the Peer Helpers followed a consistent weekly format. Beginning in March, they prepared and reviewed lesson plans four days a week; on the fifth day, they taught the PY/PM curricula to elementary school students. As the high school and elementary school are located on the same campus, PY/PM Peer Helpers had easy access to the elementary students.

The PY/PM Peer Helper instructor, the elementary school liaison, and the five Peer Helpers from Red Mesa were trained in data collection procedures in February 2007. The elementary school liaison (who was also one of the teachers of the elementary school PY/PM classes), trained the other three elementary teachers to administer the pre-program survey. The PY/PM Program Coordinator for the Red Mesa implementation established a timeline for all PY/PM activities for the semester. Semi-weekly conference calls provided a forum for project staff and evaluators to address challenges in the first year of implementation.

The recruitment for Peer Helpers for Fall 2007 began in early March, with current Peer Helpers visiting all Red Mesa sophomore and junior classes to distribute nomination forms to students. PY/PM staff distributed faculty nomination forms as well. Students on the nomination list were given applications and recommendation forms. The goal for Fall 2007 was to have a pool of 15 Peer Helpers (5 returning and 10 new students). As of August 2007, Red Mesa staff recruited and trained 12 Peer Helpers.

Community Service and Supplementary Activities – Navajo Nation

In February 2007, Red Mesa High School had a competition to select a winning design for a poster of the Red Mesa PY/PM program that was won by a Peer Helper. In May 2007, Red Mesa Peer Helpers and staff also joined Kappie Bliss, the developer of the PY/PM program, at the *Partnerships to Prevent Underage Drinking through Policy, Education and Enforcement* conference in Phoenix.



Profile of the Participants

Twenty-one high school Peer Helpers and 388 elementary school students across five grades (1st through 5th) participated in the PY/PM project. Of the 388 PY/PM participants, 313 completed both pre-program and post-program surveys. A profile of each set of participants follows.

Peer Helpers

During the 2006-2007 school year, there was a total of 21 Peer Helpers participating in the program, with 16 Peer Helpers in the Hopi program and 5 Peer Helpers in the Navajo program. Two Peer Helpers in the Hopi program left the program before the end of the year (one due to schedule conflicts and one due to an alcohol infraction). The Peer Helpers were 16 to 18 years of age, including 10 seniors and 11 juniors, and the majority was female (13 females and 8 males).

Elementary School Students

Three cohorts of students are represented in the data for 2006-2007, including:

- 149 students at Hopi Second Mesa Day School (Fall 2006)
- 154 students at Hopi First Mesa Elementary School (Spring 2007)
- 85 students at Navajo Red Mesa Day School (Spring 2007)

Elementary students ranged in age from 5 to 13 years old, and were distributed across grades 1st through 5th. However, because this was the first year of the program on the Navajo Nation, Red Mesa Elementary School implemented the program with only students in 4th and 5th grades. Of the total 388 students participating in PY/PM, 313 (80.7%) completed both preand post-tests. Initial data on the outcomes of the 313 students who completed both pre- and post-tests are discussed in the "Baseline Data Regarding Student Outcomes" section of this report. A description of participating elementary students by site is detailed in Table 2 below.



Table 2. Participant Demographic Data

	Total # of	Sem	Grade Level					Gender		
Site	participating in PYPM	Fall 2006	Spring 2007	1st	2nd	3rd	4th	5th	Boys	Girls
Hopi	303	149	154	55	49	60	61	60	154	144
Navajo	85	~	85	~	~	~	41	44	47	38
Total	388*	149	239	55	49	60	102	104	201	182

^{*} The number of students by grade level and gender does not sum to the total of 388 PY/PM participants. Grade level was missing for 18 students and gender was missing for 5 of the participating students.

Implementation Findings

Data regarding the effectiveness of the implementation of the PY/PM program were collected through a variety of sources at both the Hopi and Navajo programs, including interviews with project staff, teachers and administrators, classroom observations during lessons, classroom response forms from Peer Helpers, focus groups with the Peer Helpers, and student survey questions. This section of the report includes findings regarding the staff and teacher assessment of the project, curriculum fidelity, and student satisfaction. Overall, the project continues to receive positive feedback from everyone involved, as well as thoughtful suggestions and awareness of areas that can be strengthened and enhanced.

Project Staff and Teacher Assessment of Implementation

Hopi Nation Implementation Strengths and Challenges

Interviews were conducted with project coordinators, teachers, and school administrators during the spring of 2007 to gather impressions about the second year of peer teaching at Hopi Nation schools.

The major strengths in implementation at Hopi Nation this year were strong leadership, increased recruitment of Peer Helpers, on-going training of Peer Helpers, strong coordination at Second Mesa Day School, enthusiastic support of the program, and willingness to collaborate to get the program started in a new school (First Mesa Elementary). The main challenges identified during this year included the need for more orientation before starting the program at First Mesa Elementary, difficulties in scheduling, the need for more rehearsal and preparation time for Peer Helpers, challenges in data collection, and finding time for communication among project staff and teachers. These strengths and challenges are highlighted below.

• Strong Leadership and Coordination. Project staff and teachers felt the start to Year 2 was smoother and more organized, having learned much from Year 1 implementation. The fact that the Peer Helper teacher volunteered to teach the program and understands the community and the content of the curriculum was identified as very beneficial. This year the program benefited greatly from the continued



- coordination efforts of the elementary coordinator at Second Mesa Day School. His experience from year one was invaluable in several ways because he oriented the new teachers to the program, coordinated data collection and logistics, and helped to introduce the program into First Mesa Elementary School.
- Enthusiastic support of the program. Data from interviews and site visits demonstrate strong support for the program. It was reported that teachers at Second Mesa Day School welcomed the program for Year 2 and felt confident that the Peer Helpers could deliver the program. Teachers felt that the content of PY/PM was valuable because it fulfilled some of the Comprehensive Health Education standards required by the state. Support of the program was also evident in the trust shown in starting the program at First Mesa Elementary, with relatively little lead-time. Hopi Junior/Senior High School support continues to grow among administration, staff and students, as displayed by a strong interest in the application process for the next school year.
- Increased recruitment of Peer Helpers. This year, Hopi Jr./Sr. High School successfully recruited 16 Peer Helpers (seven more than Year 1) thus enabling team teaching in almost all classes. However, the class suffered from the loss of two Peer Helpers, one due to a schedule conflict and one due to an alcohol use infraction. There were also times that Peer Helpers had to teach alone or cover another class due to an absent Peer Helper. The PY/PM teacher felt there were "too many substitutions" due to these absences. They set a goal for Year 3 to recruit enough Peer Helpers to assure team teaching and a sufficient number of substitutes to cover for absences.
- Increased training and support for Peer Helpers. Data from interviews and class observations indicate the importance of on-going training and support for the Peer Helpers. The types of training recommended by teachers and project staff included "more rehearsal time," "speaking skills so the Peer Helpers become more animated and relaxed in their teaching," and "focus on the teens' personal values and choices as a role model." This need was addressed in several ways.



The teacher developed additional sessions focused on team-building and teaching practice. Project Coordinators provided once-a-month sessions on assertiveness skills, making good personal choices, being a positive role model, and communication skills. More time was devoted to the Peer Helpers rehearsing lessons and getting feedback and suggestions for improvement.

- Need for close coordination and communication between elementary school and high school project staff, project coordinators and evaluators. Several challenges were evident in starting the program at First Mesa Elementary School. The principal from Year 1 did not return in the fall, and very little information about PY/PM was transitioned to the new acting principal. The new principal, while supportive and enthusiastic, had very little orientation to PY/PM before the Peer Helpers entered the classrooms, and the classroom teachers did not have an orientation until several weeks into the program. Scheduling for the Peer Helpers was also unclear during the first few sessions of PY/PM at the school. This resulted in some confusion and frustration during the first couple of weeks of PY/PM implementation. The confusion was remedied when the coordinator from Second Mesa and the Peer Helper teacher provided a teacher inservice which clarified the program and curriculum content, the teachers' role, expectations of the Peer Helpers, and scheduling.
- Challenges in data collection. An additional challenge was getting the pre-program surveys completed prior to program implementation at both Second Mesa Day School and First Mesa Elementary. The timeline for starting at the schools needed to be developed earlier in the year and shared with the evaluator, so that there would be adequate time for obtaining parent permissions and time for training in data collection. With everyone's help, the surveys were completed on time, but the rush contributed to confusion and frustration of the school in starting the program. Second semester pre-testing was completed more efficiently. As a solution to these challenges, it was determined that a regular conference call "team meeting" would be facilitated by Arizona Psychology Services (APS) for all key players, including the PY/PM teacher, APS, the evaluator, and the elementary coordinator or principals.



Navajo Nation Implementation Strengths and Challenges

Interviews, focus groups and one site visit were conducted with project coordinators, teachers, and school administrators to gather impressions about the first year of PY/PM implementation at Red Mesa in the Navajo Nation. Most notably, one program staff member commented how each Peer Helper seemed to benefit from their involvement in the program. Some of these observations included:

"(One Peer Helper) used to challenge authority but now has really found a niche and is staying out of trouble. (Another) was very quiet and has become a more prepared young person that is taking things in stride. (Another) was very shy, timid about speaking and he's really come out of his shell. (Another) used to sit back and observe things, take a secondary role, but now he's more of an administrator... he observes and gives recommendations. Another was very mature already, but now has more presentation skills and seems like a more civic minded adult. They've all really matured in this process, stepping out of the student role but maintaining their dignity as students."

The major strengths in implementation at Navajo during this year were staff and administration's dedication to support the program, strong coordination at Red Mesa High School and Elementary School, and solid organizational support provided by the PY/PM Program Coordinator. The main challenges identified during the year included the "rush" to implement the program, difficulties in scheduling, a small crew of Peer Helpers, new staff learning the curriculum and procedures, and challenges in data collection. These strengths and challenges are highlighted below.

• **Dedication to the Program.** The program had a formal kick-off with a full day of festivities related to the visit from the First Lady of the Navajo Nation to accept the grant award and learn about the program on February 8, 2007. During interviews conducted in May 2007 with key stakeholders at Red Mesa, all cited the First Lady's dedication to the program as a motivating factor to implement PY/PM. This dedication spread to administration and staff. Some comments included:



- o "It's an honor that the First Lady chose our school."
- o "We were very receptive and responsive to the First Lady's request to do the program. We realized that anything that comes out of the First Lady's office means you do what you need to do."
- "With the First Lady's support, we just determined that we were going to be successful with this program."
- Enthusiastic support of the program. Key informants indicated that in addition to being dedicated to program implementation, they supported the program for a variety of reasons. In post program interviews in May 2007, they noted:
 - o "I look at this new program coming into our school as a learning opportunity for the students and for me, too."
 - "The program reminded me to consider the "social" part of teaching...
 Not just focus on the subject matter but on students' lives."
 - "One day, on a national no-drinking day, a student showed up out-ofit, almost passed out from drinking. Drinking is very common on a daily basis. We need this program here, wholeheartedly, hands down, we need it."

Program and Curriculum Fidelity

One of the most difficult challenges in effective substance abuse prevention programming is finding the right balance between maintaining the fidelity of a science-based model prevention program and promoting adaptation of that program to reflect the circumstances of the community where it is being implemented. (SAMHSA, 2002). Many researchers have concluded that attention to both program fidelity and adaptation during the complex process of implementing the program is critical to successful, sustained implementation of science-based substance abuse prevention programs.

A number of studies of implementation of prevention curriculum have shown that teachers' adaptations of the material are widespread (Berman & McLaughlin, 1976; Tricker & Davis, 1988; Botvin, Griffen, Kiaz, & Hill-Williams, 2001). Yet program fidelity is generally considered an important factor in successful program implementation (Domitrovich & Greenburg, 2000). Fidelity may be particularly important to achieving program outcomes among teachers new to the curriculum (Parcel, et al., 1991). While most of the



research on program fidelity has focused on teacher-taught programs, the concepts and findings may be relevant for peer-taught classes and are an important area for future study.

An examination of program fidelity in implementing the PY/PM program at the Hopi and Navajo Nations examined three aspects of fidelity, including:

- 1. Program dosage (frequency and duration of the program)
- 2. Classroom curriculum delivery--degree to which program components were delivered as prescribed (program content), and how the program was delivered (Peer Helper approaches, skills and qualities)
- 3. Student responsiveness to the program.

Participant Attendance and Program Dosage

A total of 24 elementary classrooms received the PY/PM program during the two semesters (fall 2006 and spring 2007). In the Hopi program, there were 10 classes taught at Second Mesa Day School, and 10 classes taught at First Mesa Elementary School. In the Navajo program, there were 4 classes taught (4th and 5th grade only). All programs taught one class per week for 8 weeks as intended in the curriculum. Table 3 provides a breakdown of program dosage and participant attendance by grade.



Table 3. Attendance and Program Dosage

	Number of	Average length of sessions, in	Average number of students in	Percent of students attending	Percent of students attending 7 or
Grade	sessions available	minutes (min,max)	class daily (min, max)	all 8 sessions	8 sessions
1st	8 sessions	41 minutes (30, 50)	13 students (9, 17)	58.1%a	81.4%
2 nd	8 sessions	39 minutes (20, 50)	19 students (10, 32)	59.2%ª	83.7%
3rd	8 sessions	44 minutes (25, 60)	14 students (9, 16)	44.8%ª	68.9%
4 th	8 sessions	46 minutes (25, 95)	16 students (8, 20)	45.7% b	87.0%
5 th	8 sessions	49 minutes (30, 70)	15 students (11, 20)	65.5% b	87.9%
Total		44 minutes (20, 95)	15 students (8, 32)	53.8%	

^a Percent based on data for 86% of 1st-3rd grade students.

As Table 3 shows:

- Eight sessions (the full curriculum) were available for all five grades.
- The average length of sessions was 44 minutes, with the longest sessions being reported amongst the older grades. The curricula designed lessons to last 45-50 minutes.
- The average number of students in class ranged from 8 to 32 and a mean of 15 students. Among all the grades, the 2nd grade classes reported the highest average number of students per class compared to the older grades.



 $^{^{\}rm b}$ Percent based on data for only 49% of 4th-5th grade students. There is no session attendance data for 51% of students in 4th-5th grades.

• The percent of students receiving <u>all 8</u> sessions of the curriculum ranges from 45%-66%. This is significantly lower than in the previous year. However, there was much missing data due to new program start-up at Red Mesa schools and First Mesa Elementary School. The percent of students who attended at least 7 sessions rises significantly, indicating a large majority of children received nearly all the curriculum.

The difficulties in data collection may be attributed to not having attendance forms at the time of teaching, a lack of time or attention or interest among the Peer Helpers to complete the forms, and lost data due to mail problems in the school systems. This finding points to the need for more training for the Peer Helpers to complete the attendance forms, and a tighter system for collecting and checking attendance forms.

Classroom Curriculum Delivery

Teacher and Staff Observations

Teachers and program staff were asked to complete Classroom Observation forms immediately after every class session to provide feedback regarding the classroom atmosphere, student engagement, and presentation of the material. The observation forms were collected and given to the Peer Helper teacher to use in debriefing each lesson with the Peer Helpers. Forms were then sent to the evaluator for analysis. Interviews with program staff provided additional insights about lesson fidelity.

In total, 131 classroom observations (out of a possible 192) were conducted with approximately 40% coming from Navajo Red Mesa Schools and 60% coming from the two Hopi schools. Classrooms that were observed ranged from 8 to 30 students and the majority of observations were conducted by classroom teachers. Overall, the average number of times a Peer Helper received an observation form was 6, with some students being observed only once during the semester and others up to sixteen times. Data showed that not all classrooms received an observation form for every lesson. Lesson #1, on the brain, received almost twice as many observations as the other 7 classes, indicating a closer observation of the Peer Helpers while they got to know the class.



Qualities and Skills of Peer Helpers

Observer feedback on the lessons included many positive comments about the Peer Helpers in both programs. Over all sites, observers "strongly agreed" that Peer Helpers appeared to connect and interact easily with students (mean ratings of 3.73 and 3.82 out of a possible 4).

Additional findings suggest that the more experienced Peer Helpers may implement the program with more comfort and knowledge compared to less experienced Peer Helpers. Comparing the schools, observers reported a (statistically significant) higher level of connection and greater degree of interaction in the Hopi First Mesa Elementary classrooms, which were the classrooms taught by the most experienced Peer Helpers (i.e., the Peer Helpers had already taught the entire curriculum the previous semester). In addition, observers of the experienced Hopi Peer Helpers reported a (statistically significant) higher degree of preparation and knowledge of the material during the second semester classes at First Mesa Elementary School.

The majority of observers (75-85%) across all schools felt that "most or all of the time" the Peer Helpers:

- used a strong and clear speaking voice when teaching
- asked students questions to review topics
- were prepared and knowledgeable about the teaching material
- demonstrated enthusiasm for the subject matter.

Specific positive comments about Peer Helpers' presentation skills clustered around several themes including:

• Ability to check for student understanding and asking questions

- "she called on students who weren't very outspoken to answer their questions"
- o "good job slowing down so students have a chance to think about it"
- o "great example of pop quiz for checking for students' understanding"



Ability to redirect students and keep their attention

- o "they started off in command and really took charge of the class"
- "she was clear about her directions"
- "good use of notecards and wandering to monitor students performance"

• Ability to encourage interaction with the material

- "nice job of breaking into pairs and interacting"
- "they showed interest with the material-students enjoyed the artwork"
- o "she connected cultural activities on the Mesa with the lesson"

In fact, the majority of observers also reported that "75-100%" of the elementary students appeared to show interest in, and understand the material. Comments noted that elementary students were eager to participate, answered questions and liked the group activities. Nearly all observers (97%) felt the time allocation was adequate for the lesson.

Teachers observed and noted particular challenges for the Peer Helpers in the classroom, including skills such as:

- difficulty in maintaining control and attention of all students
- the need to speak more loudly and enthusiastically
- the need to take turns with one's teaching partner

Use of lesson materials

Use of program materials and reinforcement activities is an important part of fidelity to the PY/PM curriculum. Classroom observation forms reveal much missing data and very few reported observations regarding "display of PY/PM posters in the classroom" (reported in only 19 out of 131 observations). When asked if Peer Helpers conducted the PY/PM "ownership and reinforcement" activities, teachers reported yes in only 28 out of 131 observations. The reasons for these findings could be a lack of teacher understanding about what constitutes a "reinforcement activity," a lack of posters to be displayed, lack of time to complete the reinforcement activity, or simply inadequate completion of the observation form.



Although observers provided favorable feedback, they also made suggestions for enhancing the lessons:

- Providing the Peer Helpers with more opportunities to observe the classroom before they start the lessons so they can observe the teachers' teaching methods
- Need for additional visual aids (e.g., writing words on the board, providing examples of misleading advertisements);
- Proofread lesson materials more closely (e.g., some words were misspelled);
- Prepare fully and have less reliance on notes;
- Use of notecards to remember key points
- Work on transitions from one activity to another

Peer Helper Class Response Forms

The evaluation design calls for each Peer Helper to complete a Class Response Form after each classroom experience to measure program delivery, fidelity and overall class receptiveness. The tool documented changes to the program and the barriers encountered during the session. The Class Response forms were also used by the Peer Helpers and their teacher to debrief successes and challenges after each class. Class Response Forms were only submitted by the Hopi Peer Helpers during this program year due to start-up challenges at Navajo. At least one Class Response Form was completed for each session taught in each grade.

Comfort in Teaching

On the class response form, Peer Helpers were asked to rate their comfort level in teaching the lessons on a 7-point scale (from 1 "not at all comfortable" to 7 "very comfortable"). Overall, Peer Helpers were comfortable to very comfortable when teaching their lessons, with 31% of Peer Helpers feeling "very comfortable" and another 55% rating their comfort level as a 5 or 6.



The data reveal higher comfort levels in the spring 2007 semester as compared to the fall 2006. For instance, 68% of Peer Helpers felt "very comfortable" in teaching the lessons in the spring 2007 semester, while only 48% said they felt "very comfortable" in the fall of 2006. This difference is most likely attributed to the fact Peer Helpers were more experienced with their lesson plans during the second semester.

Class Participation, Energy and Disruptions

Peer helpers have many challenges managing active elementary school students in their classrooms. They are asked to reflect on the participation, energy and disruptions of the students. This information encourages discussion on classroom management techniques. Using a five-point scale to rate classroom participation (with 5 being "a lot" and 1 being "none"), data revealed that 74% of Peer Helpers rated their classroom's participation as a 4 or 5. Using the same five-point scale, Peer Helpers were asked to rate the level of disruptions among students in their classroom. Forty-three percent of the Peer Helpers reported very few or no disruptions. On the other hand, one-third (33%) of Peer Helpers indicated a moderate amount of disruptiveness, and another 23% indicated "a lot" of disruptions with a score of 4 or 5.

Time to Teach and Time to Review

In general, Peer Helpers reported feeling that they had enough time to teach the lesson (reported in 97% of the classroom experiences) as well as to review the previous lesson (reported in 94% of the classroom experiences).

Barriers to Teaching, Learning, or Participation

On the class response forms, Peer Helpers were asked to indicate if any barriers existed in their teaching of the lesson, the students' learning, or participation. Just less than half (44%) of Peer Helpers' response forms indicated barriers in the teaching, learning, or participation in the lesson.



Some of the barriers Peer Helpers reported were:

- student disruptions
- lack of student attentiveness or participation
- lack of participation
- not being prepared to teach
- no classroom teacher in the class to help with classroom management
- students not understanding the lesson or material

Changes Made to the Lesson

Overall, Peer Helpers reported that they followed the lesson plans, with 89% of student response forms indicating that no changes were made to the lesson. However, a small percentage (11%) of class response forms reveal that occasionally Peer Helpers made changes to the lesson. This data reflects a 27% reduction from the previous year in the number of students indicating they made changes to the lessons, indicating potentially higher fidelity to the lesson plans.

The types of changes made by Peer Helpers included:

- Not teaching one lesson due to insufficient time
- Changing the methods for activities, e.g., acting out scenarios as skits rather than reading them aloud, making the review into a game
- Shortening lessons due to shortened class time or lesson length
- Incorporating additional discussion of concepts, examples, and/or visual aids
- Changing the order of events in the lesson, e.g., putting the classroom activity at the beginning or the end of the lesson; "skipping around because they knew the material"
- Teaching lessons without a partner
- Adapting the activities to add culturally-sensitive elements, (e.g., including some activities from cultural days into the lesson).



Peer Helpers were asked to tell one key thing that happened during each lesson. Their answers often focused on key concepts taught in the lessons, such as:

- "they all had good commercials, funny, but with good information"
- "the students liked to talk about where their emotions come from"
- "one child asked 'how do we treat a person who is mean to me?'"
- "they told about how they think things through before they do it."

Elementary Students' Assessment and Satisfaction

After completing the eight PY/PM lessons for the year, students in grades 4 and 5 were asked to report their satisfaction with the program. Students were very satisfied with the program with over 90 percent of 4th and 5th graders reporting the program was either "Excellent" or "Very Good" and over 90% reporting that the PY/PM teachers were "Excellent" or "Very Good."

As part of the post-program survey students were also asked to indicate their responses to several questions concerning the program and its personal impact on their behavior. As seen in Table 4, a great majority (95%) of students say they "plan to use or share" aspects of the program that they have learned, and that they are more interested in the topic as a result of the program. Nearly three-quarters of students said they thought the program was useful.

Table 4. Student (4th and 5th grades) Responses to the PY/PM Program: Post-program Survey

As a result of the PY/PM program	Yes
I will do something new or different.	81.7%
I will change the way I think, act, or behave.	76.6%
The information was useful.	72.0%
I plan to use or share what I have learned.	95.4%
I am more interested in this topic.	89.1%



Students were also asked to report on several items regarding the Peer Helpers. As seen in Table 5 below, Peer Helpers received positive marks among the 4th and 5th graders receiving the lessons. Nearly all of the students said the "classes were fun" and the Peer Helpers "were good teachers."

Table 5. Student (4th and 5th grades) Responses to Peer Helpers: Post-program Survey

About the high school students	
that taught your PY/PM classes	Yes
The high school student(s) were prepared for class.	92.3%
The high school student(s) were easy to understand.	81.1%
The high school student(s) were good teachers.	96.4%
I liked having high school student(s) teach the classes.	91.7%
The classes were fun.	96.4%

The 4th and 5th grade students were asked to write the main thing they learned from the program. The most frequent responses show many children retained the key messages of the program, with:

- 59% saying "Don't drink or do drugs"
- 34% saying they learned how the brain works or how the brain is affected by alcohol
- 8% reporting to not drink and drive or not to ride with someone who has been drinking.

Peer Helpers' Assessment of the Project

Focus groups were conducted with the Peer Helpers at Hopi in August and again in May 2007. Focus groups were conducted with the Peer Helpers at Navajo schools in February and May 2007. Overall, the teens reported that they enjoyed participating in the project and were feeling more comfortable speaking to audiences. Highlights from their reflections on their experiences are summarized below.



Hopi Peer Helpers

In a focus group with 10 Peer Helpers from Hopi in May 2007, the teens discussed the most important things they learned as a Peer Helper, how they felt the program helped the elementary students, what was most helpful about the Peer Helper training, and what the schools need to do to keep the program going in future years.

When asked about the most important things they learned from the experience of being a Peer Helper or their biggest success, participants said:

"I am staying alcohol and drug free for me and my son"

"That teaching younger students can have a bigger effect on changing teens"

"I am good with children"

"I enjoyed making younger friends and seeing them in the village"

"I felt I helped someone"

" I want to pursue a career in teaching"

"I like how I am when I am not drunk or high, and I stayed drug-free for two years"

"Knowing that we made a difference in their lives"

In terms of how the Peer Helpers felt the program helped the elementary students, they shared:

"It helped them cope with family issues"

"It helped them understand the effects of alcohol on their brains and the dangers of alcohol for children"

"It helped them see that we are drug free and they can be too. They know they can look up to us"

"It helps them to listen more to teenagers and know that we are watching them"



[&]quot; I found out what I want to go to college for"

For future program implementation, Peer Helpers were asked to describe the most helpful parts of the Peer Helper training. They commented,

"Receiving a lot of info about the brain in the beginning"

"Having the whole lesson planned out"

"Getting the whole folder for the grade you are teaching"

" Observing the classroom before you go in" (mentioned repeatedly)

"Working on public speaking"

"Getting prepared and organized to deal with classroom problems and solutions"

The Peer Helpers also shared their recommendations for sustaining the program in future years:

"Start recruiting peer helpers at the end of every year, send out flyers, do presentations to get nominations"

"Maybe get some sophomores to start earlier"

"Think of ways to get the community and parents involved"

"Make it a little more interesting, more activities to do"

"Have more community things at the high school to tell people about the program"

"Mix more culture into the program. Have some elders come to the peer class to teach about culture"

"Teach the information to the older grades too"

"Get students who are good role models and who are committed to this program"



Red Mesa Peer Helpers

In a focus group conducted with four of the five Red Mesa Peer Helpers on May 14, 2007, the teens discussed their participation in the first implementation of PY/PM. The discussion focused on lessons learned, the successes and challenges of teaching, and suggestions for future training and program implementation. All four students planned to return as Peer Helpers in the Fall 2007 PY/PM program.

When asked about the most important things they learned from the experience of being a Peer Helper, participants said:

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"I think patience. Patience, like, I didn't have patience at all before
this. And I learned how to deal with the kids in my class."
"Development of the brain."
"Overcoming my shyness."
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The Peer Helpers thought their biggest success as a Peer Helper came from:

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"Having more people interested in the program right now, so now we're being role models to other teenagers as well."

"Just finishing all eight of the lessons, and getting to know the kids."

"Developing the confidence to deliver the classes."
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When asked about their training and suggestions for future trainings, participants said:

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"I didn't know all that about the brain, so (after training) when I was demonstrating it during my lesson I could do it and it was easy."

"For us, the first day will be like the first day of school...You'll get scared, want to hurry and jump into the first lesson and first activity. It's a little scary. I just want to get through it real fast. But the last day will probably be sad, like you've been with them for a whole school year."

"I would like more activities during the training."
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[&]quot;There's too much free time in the (Peer Helper) class."

"I'd like a teacher who takes a more active role."

Peer Helpers indicated that the program helped them personally, and helped other high school students as well. Comments included:

"I stopped smoking because of the information about the brain."

Finally, the Peer Helpers shared their suggestions and parting comments about their experience. These included:

"Get more staff and more Peer Helpers who are really here for the kids."

"More communication between the Peer Helpers and the staff."

"I had an amazing experience."

"It was fun teaching my kids. They were coming up to me and (my PY/PM co-teacher) and telling us thank you, thank you, thank you!"

"At the end there was a bond with the kids. That's it, that's the important thing."



[&]quot;There was a high school kid who was attending my classes with me. It helped him a lot cause he stopped drinking. He's doing great and better in his classes."

[&]quot;For me, I think it helped me to love teaching."

[&]quot;I stopped drinking and I've been sober because of the damage that it can do to you."

Baseline Data Regarding Student Outcomes

This section of the report presents baseline descriptions of the elementary students and Peer Helpers who participated in the PY/PM program, during the 2006-2007 school year. The data that follow were derived from surveys given to students and Peer Helpers before starting the program (pre-test) and again at the end of the program (post-test). The following analyses are based upon those students who completed both a pre- *and* a post-test survey (a matched set). Available attendance data shows that 388 elementary students received at least one session of PY/PM, but 313 participants completed both pre and post surveys, resulting in an 80.7% survey completion rate overall.

Table 6. Matched Surveys: Students Completing both Pre- and Post-Test Surveys by Site

	Total # of students	# of students completing both pre- and post-test by semester		Total students completing both pre- and post-test	
Site	participating in PYPM	Fall 2006	Spring 2007	Number	% of participants
Hopi	303	113	143	256	84.5%
Navajo	85	~	57	57	67.1%
Total	388	113	200	313	80.7%*

^{*} Percentage is derived by dividing the number of students completing both the preand post-test surveys by the total number of students who actually participated in the PY/PM program.

As shown in Table 6, the percent of total students across both sites completing both the pre-test and post-test program surveys was 80.7% and varied by site. With limited resources, it was necessary for teachers to administer the pre- and post-tests after being trained by LeCroy & Milligan Associates, Inc. As for the 19.3% of students who did not complete both a pre- and post-test, a variety of issues likely contributed to missing surveys, including:



- parents not giving consent for students to be surveyed
- students not returning consent forms in time for survey administration
- students absent on day of administration
- lack of initial buy-in from some elementary school teachers
- late enrollment of students into school (i.e., if the student's name was not on the class roster, the student would not have a survey ID assigned to him/her and may not have completed a survey).

LeCroy & Milligan Associates, Inc. will continue to work with teachers and coordinators to address the issues encountered during survey collection and strive to improve the survey completion rates in the future.

Elementary Students, Grades 1-3

Students receiving PY/PM were asked to complete pre- and post-program surveys to assess their knowledge about the brain and what they thought about underage drinking and vehicle safety. One hundred fifty (91.5%) students in $1^{\rm st}$, $2^{\rm nd}$, and $3^{\rm rd}$ grade participated in the PY/PM program *and* completed both pre- and post-surveys.

- 53% were boys and 47% were girls
- 36% were first graders
- 28% were second graders
- 36% were third graders
- Overall, 55% attended all eight sessions
- 23% attended seven out of eight sessions
- 22% attended six or fewer sessions.

The survey for grades 1-3 consisted of six questions. Data regarding student responses can be found in the tables below. Baseline data from the second year of PY/PM suggest that younger students learned some of the concepts taught in the program. For instance, students gained an increased awareness of the importance of the brain with almost 9 out of 10 students (86.1%) noting that the brain was the "boss of your body" on the post-test. Additionally, at the conclusion of the program, more 1st – 3rd graders were aware of the harm for teens to drink alcohol, but with only 52.4% believing it is harmful at post-test, there is still a need for more emphasis on this message. Also, the number of youth who indicated you should talk to the driver if they consumed alcohol decreased slightly from pre- to post-test, which reflects desirable changes in responses.



Table 7a. Baseline Data Regarding Student Outcomes – Grades 1, 2, 3 (N=150)

What is the boss of your body?	Pre-Program	Post- Program	
My Heart	45 (30.4%)	20 (13.9%)	
My Brain	103 (69.6%)	124 (86.1%)	

Is it harmful for teens to drink beer, wine, or alcohol?	Pre-Program	Post- Program
Yes	62 (41.6%)	75 (52.4%)
Sometimes	9 (6.0%)	3 (2.1%)
No	78 (52.3%)	65 (45.5%)

Should you talk to the driver if they drank beer, wine, or alcohol?	Pre-Program	Post- Program
Yes	14 (9.4%)	9 (6.3%)
Sometimes	5 (3.4%)	3 (2.1%)
No	130 (87.2%)	131 (91.6%)

Students were also asked to write or draw something to show the main thing they learned from PY/PM. Their responses helped to illustrate students' understanding of key PY/PM messages and included such statements as:

- "Alcohol can damage your brain."
- "Don't drink and drive"
- "I learned not to drink or do drugs"
- "I learned that beer affects your body"

Data shows that the young students start into the program with some well-formed ideas about vehicle safety, with over 90% understanding the safest place to sit is in the back seat, and that it is not okay for people to drive after drinking. These perspectives were maintained at post-test as shown in Table 7b.



Table 7b. Baseline Data Regarding Student Outcomes – Grades 1, 2, 3. (N=150)

Where is the safest place to sit in a car?	Pre-Program	Post- Program
Front Seat	6 (4.0%)	5 (3.5%)
Back Seat	143 (96.0%)	139 (96.5%)

Is it okay for people to drive when they drink beer, wine, or alcohol?	Pre-Program	Post- Program
Yes	4 (2.7%)	6 (4.2%)
Sometimes	3 (2.0%)	3 (2.1%)
No	142 (95.3%)	134 (93.7%)

Elementary Students, Grades 4-5

Students receiving PY/PM in 4th and 5th grades were asked to complete preand post-program surveys to assess their knowledge about the brain and attitudes with respect to underage drinking and vehicle safety. The pre-test and post-test contained sets of questions that comprised scales to measure several constructs associated with underage drinking and vehicle safety:

- Attitudes toward Underage Alcohol Use
- Intentions to use alcohol
- Vehicle Safety Skills (riding with an impaired driver)
- Media Literacy
- Perceived Harm of Underage Alcohol Use

Items on the survey were rated on a four-point Likert-type scale (e.g., scores of 1, 2, 3, and 4), with 4 being the most desirable (positive) response.



A total of 163 students in grades 4-5 completed both pre- and post-program surveys (79% of all students). Among the 163 students who completed both pre- and post-tests:

- A little over half (53%) were in the 5th grade
- Just less than half (47%) were in 4th grade
- 55% of students attended all eight sessions
- 32% completed seven of the eight sessions
- 13% attended six or fewer sessions
- 51% of the students were male, and 49% were female.

Table 8 displays the mean scores on the five scales. Questions comprising the scales and their respective mean scores are also presented. At the completion of the second year of PY/PM program, the results of the survey data for 4^{th} and 5^{th} graders illustrate positive, or desirable, increases in mean scores for all five scales (as compared to three scales the previous year). The data revealed statistically significant increases in two scales — attitudes about underage alcohol use and media literacy. In the previous year, media literacy was the only scale to show significant change. Each scale is discussed below, followed by data in Table 8.

Attitudes toward Underage Alcohol Use

When comparing students' attitudes towards underage drinking from pre- to post-test, students showed a significant increase in desirable attitudes against underage drinking. After receiving the program, 4th and 5th graders were more likely to say that alcohol use among minors is not "okay;" and they were more likely to say that drinking is not "okay" even if they only drink "a little." There was little change from pre- to post-test in how students perceive drinking alcohol as a minor if "they are at home." However, as seen in Table 8, this rating remained favorable from pre- to post-test.



Alcohol Intentions

Students' ratings regarding their intentions to use alcohol when they are older was the highest, or most desirable, scale reported on both the pre- and post-test measures, indicating children start the program with strong intentions not to use alcohol and remain that way (therefore not showing significant difference from pre to post). This may reflect the common notion that younger students often report more socially desirable responses. However, because students are continually exposed to negative social, family, community, and media messages it is a positive result that the program seems to maintain desirable intentions over the course of the program year.

Vehicle Safety Skills

The mean score on vehicle safety skills increased from pre- to post-test, but not significantly. When looking at the individual items that make up the scale, it suggests that participants increased their awareness in regards to not talking to the driver who had been drinking alcohol and to not sit in the front seat. Students started and remained aware that they should not ride in the front seat with a driver who has been drinking alcohol, as the post-test mean remained relatively constant. However, one concern is the large decrease in students who report that they may forget to wear their seat belt in the future. This result, however, may be due to survey error as the wording of the question could have confused some of the students.

Media Literacy

The scale of Media Literacy aimed to make children more aware and critical of the deceptive nature of television, especially as they portray alcohol use. Students' scores on Media Literacy changed significantly in the positive direction after receiving the program. In other words, after the program, 4th and 5th graders were more likely to agree that commercials do not always tell the truth; that commercials do not always tell us what we need to know; that commercials do not accurately represent the consequences of drinking beer; and the commercials do in fact leave out important information.



Perceived Harm of Underage Alcohol Use

Moving in the positive direction, but not statistically significant, students' perceptions of the harm of underage drinking *increased* slightly. This result is a promising change from the previous year (in which children showed a significant *decrease* in their perceptions that underage alcohol use was harmful). It is possible that the Peer Helpers were more effective in teaching the concepts this year, or perhaps some of the students retained some knowledge from the previous year's exposure to the program. With another year of program exposure, even greater gains may be seen in next year's data.

Table 8. Baseline Data Regarding Student Outcomes – Grades 4 - 5 (N=163) NOTE: Tests of significance were performed on scales and their respective items but only the results of differences in scores on scales are reported here.

Scale	Pre-	Post-
Items	test	test
	Mean	Mean
Attitudes toward Underage Alcohol Use	3.23	3.39a
(1=Strongly Agree to 4=Strongly Disagree)		
Drinking alcohol is okay for people under 21 if they do not drive.	3.24	3.51
Drinking alcohol is okay for people under 21 if they are at home.	3.50	3.51
Drinking alcohol is okay for people under 21 if they only drink a	2.96	3.15
little.		
Alcohol Intentions	3.64	3.66
(1=Definitely to 4=No Way)		
In the future, do you think you will		
Drink beer	3.46	3.49
Drink wine, 'hard lemonade,' or wine coolers	3.69	3.70
Drink liquor (whiskey, vodka, tequila, etc)	3.77	3.80

Vehicle Safety Skills	3.30	3.39
(1=Strongly Agree, to 4=Strongly Disagree)		
If you ever had to ride in a car with a driver who had been drinking		
alcohol (like beer, wine, or liquor), what would you do?		
Talk to the driver	2.99	3.12
Sit in the front seat to be near the driver	3.54	3.69
(1=Definitely to 4=No Way)		
In the future, do you think you will		
Ride in a car with a driver who has drunk any alcohol	3.55	3.57
Forget to wear a seatbelt when in a car	3.12	2.18
Media Literacy	2.68	2.97b
(1=Strongly Agree to 4=Strongly Disagree)		
Commercials on TV leave out important information.*	2.74	3.14
Beer commercials on TV show what happens when	2.62	2.83
people drink beer.		
Commercials on TV always tell us what we need to know.	2.67	2.81
Commercials on TV always tell the truth.	2.69	3.31
Perceived Harm of Underage Alcohol Use	2.99	3.09
(1=Not at all to 4=A lot)		
How much do you think people under 21 years of age will harm		
themselves if they		
Try one or two cans or bottles of beer?	2.96	3.02
Try one or two glasses or bottles of wine, 'hard	2.97	3.16
lemonade', or wine coolers?		
Try one or two shots of liquor (whiskey, vodka, tequila, etc)?	3.10	3.23
Have one or two cans, bottles, glasses, or shots of any		
alcohol once a month?	2.95	2.96

^{*} Reverse-scored so that 4 represents the desired behavior (e.g., 4=Strongly Agree, 1=Strongly Disagree).

b Paired samples t-tests indicated statistically significant difference in scores from pre- to post-test on media literacy (p<.001).



a Paired samples t-tests indicated statistically significant differences in scores from pre-test to post-test on Attitudes Toward Underage Alcohol Use (p<.05).

Pre-Program Exposure to Alcohol & Drugs

Participants in 4th and 5th grades were also assessed on alcohol use behavior, which indicated whether students ever drank alcohol, used marijuana, used other illegal drugs, or rode in a car with a driver who had consumed alcohol. The results indicate that some alcohol use had already occurred by the time students were in 4th or 5th grade. As reported before they began the program:

- about 6% had tried wine/wine coolers
- about 6% used marijuana
- about 1% of the students had tried beer
- less than 1% had tried hard liquor
- and less than 1% percent had used other illegal drugs.

Furthermore, approximately 22% had previously ridden in a car with a driver who has consumed alcohol. Of the students who say they have ridden with an impaired driver:

- 8% say it occurs about once a day
- About 7% say it occurs about once a year
- In addition, about 6% say it occurs either once a week or once a month.

These findings suggest that children are being exposed to alcohol at younger ages and are being placed in unsafe driving situations at alarmingly high rates. This finding continues to stress the importance of a comprehensive approach to prevention and intervention programs that aim to change youth, family and community attitudes and behaviors about alcohol and drug use.

Peer Helpers

Sixteen high school students at Hopi Jr./Sr. High School started with the program in the fall of 2006, and most taught both fall and spring semester. One student withdrew from the program due to an alcohol infraction and one student left due to a class schedule conflict, leaving 14 in the program at year-end. Five high school students became Peer Helpers at Navajo Red Mesa School in the spring of 2007. Overall, the Peer Helpers were 16 to 18 years of age, including 10 seniors and 11 juniors, and the majority was female (13 females as compared to 8 males).



Peer Helpers completed surveys prior to being trained in PY/PM and again after teaching the curriculum at the end of the school year. The evaluation design sought to assess the effect of the program in increasing Peer Helpers' knowledge of vehicle safety and the effects of alcohol on youth. Pre- and post-tests contained sets of questions that comprised scales to measure constructs associated with underage drinking, including:

- Knowledge of the effects of underage drinking
- Future intentions toward alcohol use
- Perceived risks of high levels of alcohol use
- Perceived risks of low levels of alcohol use
- Self-efficacy
- Teaching skills.

Items on the survey were rated on four-point Likert-type scales (e.g., scores of 1, 2, 3, and 4), with 4 being the most desirable (positive) response. Peer Helpers were also asked about recent alcohol and drug use.

Table 9 displays the mean/average scores on six scales. Questions comprising the scales and their respective mean scores are also presented. While all of the 21 Peer Helpers completed pre-test surveys, unfortunately *post*-surveys were received for only six Peer Helpers. Therefore, it is not statistically possible to conduct statistical analyses or to compare the differences in the mean scores with a high degree of certainty. Due to the small number of post-surveys received, only the Peer Helpers' mean scores at pre- test are described in this report and unfortunately we were not able to analyze changes from pre-to post- test. With small samples, even one response could distort or impact the results. As a result, more time and a larger sample size are required to fully interpret program impacts among the teens.

The data at pre-test illustrate a number of positive survey responses at the time the Peer Helpers entered the program, but reveal areas for growth in knowledge and attitudes. For example, as seen in Table 9 below, Peer Helpers displayed moderate knowledge about how alcohol affects the brain and development of people under 21. Students' intentions to use alcohol were leaning toward the positive responses but show room for increases, with a mean of 2.98 (out of 4) regarding their intent to use various types of



alcohol when they get older. Students at pre-test appear to have a fairly high score (mean of 3.63) regarding their perception of the risks of high levels of alcohol use (binge drinking), but less so regarding low levels of alcohol use. In terms of Peer Helpers' self-efficacy, a measure of their beliefs about their capabilities to resist pressure to use alcohol, they have a mean score of 3.48 at pre-test, indicating a fairly high level of confidence. And finally, the Peer Helpers' perceptions of their teaching skills and abilities were in the midrange of the scale with a 2.76 mean at pre-test.

Table 9. Peer Helpers' Attitudes and Knowledge at Pre-Test(n=21)

Scale	Pre-test
Items	Mean
	(n=21)
Knowledge of the effects of underage drinking	3.13
(1=Strongly Disagree to 4=Strongly Agree)	
Drinking alcohol is more dangerous for people younger than 21 than for people	3.05
older than 21.	
It's okay to drink alcohol when you're under 21 if you don't get caught.*	3.67
I know what alcohol does to the brains of people under 21.	2.43
Drinking alcohol harms the development of people under 21.	3.38
Future intentions toward alcohol use	2.98
(1=Definitely will to 4=Definitely won't)	
Sometimes we don't know what we will do as adults, but we may have an idea.	
Please put an X in the box to answer how true these statements may be for you.	
I will drink alcohol when I get older*	2.81
I will drink beer when I get older.*	3.19
I will drink wine or hard liquor, like vodka, gin, or whiskey.*	2.95
Perceived risks of high levels of alcohol use	3.63
(1=No risk, to 4=Great risk)	
Do people under 21 years old risk harming themselves (physically or in other ways)	
if they	
Have one or two alcoholic beverage nearly every day?	3.62
Have five or more alcoholic beverages at one time?	3.76
Drive after drinking one or two alcoholic beverages?	3.48
Drive after drinking three or more alcoholic beverages?	3.67



Perceived risks of low levels of alcohol use	2.41
(1=No risk to 4=Great risk)	
Do people under 21 years old risk harming themselves (physically or in other ways)	
if they	
Have one or two alcoholic beverages (beer, wine, wine cooler, hard liquor) once or	2.19
twice a year?	
Have one or two alcoholic beverages once or twice a month?	2.62
Self-efficacy	3.48
(1=Definitely couldn't say no, to 4=Definitely could say no)	
If I was offered alcohol at my friend's house	3.48
If I was offered alcohol by my older brother or sister	3.67
If I was offered alcohol by other older persons, including my	3.71
relatives	
If I was offered alcohol at a party or dance	3.24
If I was offered alcohol by my boyfriend/girlfriend	3.38
If I was offered a ride by someone who had been drinking	3.38
Teaching skills	2.76
(1=Strongly Disagree to 4=Strongly Agree)	
I am comfortable teaching children.	3.48
I understand how children's brains develop.	2.24
I have good public speaking skills.	2.45
I am comfortable presenting information in front of groups.	2.81

^{*}Items were reverse-scored so that 4 represents the desired behavior.

The Peer Helper survey included several questions about alcohol and other drug use. As can be seen in Table 10 below, before starting the program several students reported recent alcohol or other drug use, as well as impaired driving or riding with an impaired driver. This is of concern because the students are role models and the younger students are often aware of their behaviors both in and out of the classroom. It is unknown if the students ceased drug use during the program, although the reports and observations of key informants were positive and indicated no problems with these issues.



Table 10. Recent Alcohol and Drug Use pre-test - Peer Helpers

	Pre-test
Item	(n=21)
Recent alcohol use (beer, liquor, or wine)	7 (33%)
Recent illegal drug usage (marijuana, ecstasy, LSD, meth)	3 (14%)
Riding with impaired driver	6 (29%)
Driving after drinking	1 (5%)

Caution in interpreting data

The evaluation team attempted to use the evaluation design and survey materials provided by the curricula developer, with some adaptations for cultural relevance to this target group. While there appear to be some positive trends from pre- to post-test among the elementary students and the Peer Helpers, it is important to note some factors that contribute to the need to take caution in interpreting the meaning of the changes at this point. First, there are difficulties in testing young children that affect results, including comprehension difficulties and social desirability. Studies suggest that younger children have shorter attention spans and tend to respond less consistently (Borgers, de Leeuw, & Hox, 2000). Second, with the small numbers of Peer Helpers, it is difficult to assess statistical significance of the survey results. Third, PY/PM is a peer-led program; accordingly, variation in Peer Helpers' efforts could create differential effectiveness by grade and/or class. Fourth, developing valid and reliable scales to measure the change for children in this age range is challenging. Accordingly, the reliability of some scales has not been shown to be consistently high. Fifth, without a comparison or control group, it is also difficult to measure the true impact of the program. Finally, the students in the upper grades have not had the curricular material from the earlier grades and thus are being surveyed on material they haven't had. Because the program intervention is designed to be five years in length, it is likely the impact of the program will best be told after that time.



Summary

The evaluation findings for this year reinforce the first year's findings that the program was well received and perceived as benefiting both the elementary students and the Peer Helpers. It was apparent that Peer Helpers, teachers, and project and school administrators are committed, receptive and working to improve the program. It appears that program fidelity may have been somewhat stronger this year, particularly at Hopi schools who are in their second year of implementation. Many aspects of the PY/PM program incorporate the critical elements and principles of effective prevention programming, including developmentally appropriate content, interactive learning and teaching, small group size, use of accurate information, and involvement of young people as peer teachers.

Since implementation of the PY/PM program has been ongoing for only two years at Hopi, and a half of a year at Navajo, interpretation of outcome results should be undertaken with caution. While there appear to be positive baseline trends from pre-test to post-test among the elementary participants' responses, a number of factors affect the quality of findings, including difficulties in testing young children, and exposure to messages from other sources (e.g., parents, siblings, peers, media), and lack of a comparison group. In addition, given the program model is based on building a cumulative set of knowledge and skills over five years of program exposure, it will take several years to clearly identify the impacts of the program on student and teen attitudes and intentions and behaviors regarding underage alcohol use.

This annual report provides a summary of implementation activities and baseline information on participant outcomes that occurred during the 2006-2007 program year.

Key implementation findings for the 2006-2007 program year:

- Over 380 students and 21 Peer Helpers participated in the PY/PM program at Hopi and Navajo schools.
- About half of the elementary students got a full dosage of the program, but between 78-83% got at least seven out of eight sessions.



- Fidelity was closely monitored by completion of Peer Helper response forms which showed that the Peer Helpers covered most of the program material. For approximately 11% of the classroom experiences, Peer Helpers made some adaptations to the lessons, a decrease from 33% the previous year, indicating potentially stronger fidelity.
- Adaptations to the curriculum were made for cultural appropriateness and time constraints.
- Peer Helpers reported feeling challenged by classroom management, but they received additional training and practice to improve their skills throughout the year.
- During their second semester of teaching, the Peer Helpers exhibited more confidence and knowledge, and interacted more with the students.
- Elementary school participants seemed quite receptive to, and satisfied with, the program.
- Peer Helpers and their teachers report a number of personal benefits from their involvement in the program.

Key outcome findings-elementary students

- There appear to be positive trends from pre-test to post-test in knowledge gain among elementary students.
- Younger students (grades 1st through 3rd) reported more awareness of the brain as the "boss of the body" on the post-program survey. For these same students, understanding of vehicle-related safety (e.g., safest place to sit in a car, not talking to the driver if the driver drank alcohol, and responding it's not okay to drink and drive) was high at pre-test and remained high at post-test.
- To identify significant changes, responses on the pre-test were compared to those on the post-test for grades 4th through 5th. Paired samples t-tests indicated statistically significant *increases* in media literacy (indicating more awareness of advertising tactics) and attitudes about underage alcohol use (indicating more negative attitudes about alcohol use among minors). Changes in mean scores on the other scales for grades 4th and 5th were in the positive direction, but not statistically significant.



- Among participants, intentions to engage in risky behavior showed no change. However, students revealed relatively strong intentions to not engage in underage alcohol use prior to PY/PM participation, which remained high at program completion.
- According to self-report data at pre-test, alcohol and other drug use among 4th and 5th graders was lower this year than the previous year. Reported alcohol use decreased from almost 20% to 6%, and marijuana use decreased from 25% to 6%. Reasons for this could include decreased experimentation, testing error, changes in perceived norms (i.e., it is less "cool" to report alcohol use), and differing characteristics among the school districts.
- Approximately 22% of 4th and 5th graders had ridden in a car with an impaired driver *prior* to receiving PY/PM, compared to 40% the previous year.
- There was no significant increase in participants' protective skills related to vehicle safety possibly indicating the lack of control young people feel over these situations.

Key outcome findings - Peer Helpers

- Focus group data collected at the conclusion of the program year, revealed that Peer Helpers:
 - Greatly enjoyed participating in the project
 - Felt they gained more skills and confidence in public speaking
 - Felt they were a positive role model for the younger students
 - Learned classroom management skills and teaching skills
 - o Learned a great deal about alcohol's affect on the brain
- Many Peer Helpers felt the program helped them stay drug-free during the year; however, one student left the program due to alcohol use.
- Due to their participation in the program, several Peer Helpers reported they intend to pursue a teaching career.
- Results regarding Peer Helpers' reports of their own alcohol and other drug use prior to the program changed from last year to this year. This year, 33% (7 students) reported prior alcohol use compared to none the previous year. Further, 29% (6 students) reported riding with an impaired



driver this year (compared to none the previous year). These candid responses prior to starting the program could indicate greater trust and openness among program staff and students. No post-program data was available.

- Due to data collection difficulties, too little post-test data was available for analysis. Pre-program survey data illustrate a number of positive responses at the time the Peer Helpers entered the program, including:
 - High mean scores regarding their perceptions of the risks of binge drinking and driving while impaired
 - o A moderate understanding of how alcohol affects the brain
 - High mean scores regarding their perceived abilities to resist pressure to use alcohol.
- Peer Helpers at pre-test showed less knowledge about the risks of low levels of alcohol use, and a moderate level of confidence in their speaking skills.



Recommendations

Based on this year's evaluation findings, the evaluation team recommends the following:

- 1. Increase emphasis and training in completing the reinforcement and ownership activities in the elementary classrooms
- 2. Provide increased time for the Peer Helpers to observe elementary classrooms prior to starting their teaching.
- 3. Encourage the elementary classroom teachers to share their classroom management methods with the Peer Helpers to gain concrete suggestions and feedback at each grade level.
- 4. Program coordinators and teachers should observe and assess Peer Helpers' teaching skills and confidence throughout the year, and provide tailored "refresher" and supplemental trainings to increase specific teaching skills.
- 5. Ensure that all the materials from each lesson are completed and the full 8 lessons are provided to all students.
- 6. Continue to develop, expand and document community and school service projects for second semester.
- 7. Continue to retain some second year Peer Helpers as well as recruit new Peer Helpers early in the spring.
- 8. Provide support, training, and ongoing resources to strengthen Peer Helpers' personal resistance skills and quickly address any alcohol or drug use among students with referrals for counseling and early intervention.
- 9. Build and maintain connections with elementary school and high school teachers, the school administrators, the program coordinators, and evaluators to ensure accurate and timely data collection.
- 10. Continue to collect evaluation data for the full duration of the curricula sequence.
- 11. Outline a plan for sustaining the program, including incorporating it into a framework of a comprehensive school-wide approach to alcohol and other drug abuse prevention and early intervention.



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Appendix A

Process Evaluation Questions

Process Questions	Data Source
How many elementary school-aged youth participated in the program?	Consent formsAttendance sheetsPre- and post-program surveys
How many teen Peer Helpers participated in the program?	Peer Helper assent formsPeer Helper tracking forms
What percentage of the scheduled education sessions did the elementary school-aged youth attend (i.e., dosage)?	Attendance sheets
To what degree did the program adhere to the Protecting You/Protecting Me curriculum as intended (i.e., fidelity)?	Class response formsClassroom observation formsFocus groups with Peer Helpers
To what degree were the participants receptive and engaged in the program?	Classroom observation formsFocus groups with Peer Helpers
Were the participants satisfied with the program?	 Participant satisfaction surveys Focus groups with Peer Helpers Focus groups with elementary school students
What were the outcomes and limitations of the Protecting You/Protecting Me curriculum?	 Focus groups with Peer Helpers Focus groups with elementary school students Interviews with teachers
Is the Protecting You/Protecting Me curriculum culturally appropriate for the targeted youth?	Interviews with teachers



Outcome Evaluation Questions for Elementary School Participants and Peer Helpers

Outcome Questions for Both Elementary School Participants and Teen Peer Helpers:	Data Source
Was there an increase in participants' knowledge about the brain and physiological risks associated with alcohol use?	Pre- and Post-program surveys
Was there a decrease in participants' attitudes favorable to underage drinking? (Grades 4 and 5 only)	Pre- and Post-program surveys
Was there a decrease in participants' intentions to engage in risky behaviors, including expectations to use alcohol while underage?	Pre- and Post-program surveys
Was there an increase in understanding of advertising tactics? (Grades 4 and 5 only)	Pre- and Post-program surveys
Was there a change in the perception of the age one reaches adulthood?	Pre- and Post-program surveys
Was there a change in current use of alcohol or illegal drugs? (<i>Grades 4 and 5 only</i>)	Pre- and Post-program surveys
Was there an increase in participants' protective skills related to vehicle safety and passenger safety?	Pre- and Post-program surveys



Outcome Evaluation Questions for Teen Peer Helpers

Outcome Questions for Teen Peer Helpers:	Data Source
Was there an increase in participants' understanding of child development?	Pre- and Post-program surveys
Was there an increase in participants' perceptions of self-confidence, assertiveness, or public speaking ability?	Pre- and Post-program surveysFocus groups with Peer Helpers
Was there an increase in participants' assertiveness skills and protective skills in situations where alcohol was present?	Pre- and Post-program surveys
Was there a decrease in participants' alcohol use, including binge drinking?	 Pre- and Post-program surveys Focus groups with Peer Helpers

